easy extraction of the calculus. Mr. Rai Ram Narain Dass deprecates everything like laceration of the tissues; hence he always uses a probe-pointed bistoury to effect their division, if, after the removal of the staff, they are found to offer undue resistance. The stone being removed, and the bladder washed out, a female catheter or gum-elastic tube is inserted in the wound to conduct off the urine, retention being maintained for twenty-four hours in the child, and for forty-eight hours in the adult. When the stone is uncommonly large, or very difficult of extraction, Mr. Dass does not hesitate to extend the incision into the anus, or even into the rectum; and, under such circumstances, he takes special pains to wash out the wound every second hour with tepid water, to prevent the lodgment of fecal matter in the bladder. Under this management the wound rapidly heals, leaving, perhaps, merely a small recto-vesical fistule, which eventually disappears under the occasional application of caustic. He has never lost any patient from hemorrhage, or urinary infiltration; nor has he ever met with an adherent stone, or a stone surrounded by a false membrane, the result of plastic deposit.

It has been already seen that the success of our author has been most extraordinary, the mortality in the 248 cases being only 17, or in the ratio of 1 to 14½. The death-rate in children from two to ten years was 1 in 28; from ten to twenty, 1 in 13⅓; from twenty to thirty none died; but from this period on the mortality strikingly increased, so that the death-rate from thirty to forty was 1 in 10½; from forty to fifty, 1 in 7; and from fifty to sixty, 1 in 2½. One patient operated upon after sixty, recovered; and one after seventy, died. If we compare the results of these operations with those of other lithotomists, they will be found to be eminently flattering to the skill, care, and judgment of Mr. Rai Ram Narain Dass. Cheselden, the greatest lithotomist of his day, lost 20 cases out of 213; and Liston, another great surgeon, 16 out of 115. Guersant, at the Hôpital des Enfans, Paris, cut 60 children, with a loss of 9. The alleged success of Dudley, who is said to have lost only 6 cases out of 207, is exceedingly problematical, as, it is well known, he kept no record of his operations, and hence could only guess at an approximate result.

We thank Surgeon Dass for the pleasure and instruction we have derived from a perusal of his interesting and valuable monograph; and, although he is no longer young, we shall look for other contributions from his pen in other fields of surgery, embodying, as this does, the results of his large experience.

S. D. G.

ART. XXIII.—*Cyclopædia of the Practice of Medicine.* Edited by Dr. H. VON ZIEMSSEN. Vol. XIV.—*Diseases of the Nervous System and Disturbances of Speech.* By Prof. A. EULENBURG, of Greifswald; Prof. H. NOTHNAGEL, of Jena; Prof. H. VON ZIEMSSEN, of Munich; Prof. F. JOLLY, of Strasburg; Prof. A. KUSSMAUL, of Strasburg; and Dr. J. BAUER, of Munich. ALBERT H. BUCK, M.D., of New York, editor of American edition. 8vo. pp. xx., 893. New York: William Wood & Co., 1877.

THE diseases of the nervous system form a class which probably occasions more embarrassment to the average practitioner of medicine than any other. And this is true not only of their treatment but also as respects their diagnosis. Symptoms presenting a close resemblance may spring from very different lesions, a fact which is illustrated by paralysis agitans and insular sclerosis; no one having noticed that the trembling in the latter disease only attended voluntary movements until

Charcot pointed out the fact. This is only one of the many instances which might be adduced to show the difficulties which surround the differentiation of nervous disease and the valuable additions which recent observers have made to our knowledge of the pathology of the nervous system. Since none of the text-books in general use at the present time treats of nervous diseases with anything like the same detail, the volume really supplies a want; and since most of the contributors are identified with the subjects they have written of and are probably known by reputation to our readers, it is scarcely necessary to add that it does this well.

To Eulenberg has been committed the task of describing the vaso-motor and trophic neuroses, which include hemicrania, angina pectoris, the so-called Basedow's disease, progressive muscular atrophy, pseudo-hypertrophy of the muscles, true muscular hypertrophy, and unilateral progressive atrophy of the face. The two theories which have been thought to explain most satisfactorily the phenomena of hemicrania are those of Du Bois Reymond and Mœllendorff. The former observer, it will be remembered, assumed that certain forms of migraine were caused by a unilateral tetanus of the vessels of the head, or tetanus in the district supplied by the cervical sympathetic. The latter, on the other hand, attributed the pain to a unilateral relaxation of the vessels of the head, from want of energy of the vasomotor nerves. The author believes, however, that neither of these theories is entirely correct, while they are both partially so, or, in other words, that local anomalies of circulation in the brain, without regard to their special mode of origin, are to be regarded as the essential and universal causal condition, while, on the other hand, tetanus or relaxation of the muscles of the vessels exercises rather an indirect influence, confined to single cases, and acting through the local anæmia or hyperæmia of which it is an important cause. The classes of cases in which there is tetanus of the vessels he distinguishes as hemicrania sympathico-tonica; that in which there is relaxation as hemicrania angio-paralytica, a distinction which he holds is not without its value in therapeutics.

When we turn, however, to the treatment of this disease, we do not find as many suggestions as we had hoped. Caffein, arsenic, bromide of potassium, iron, and quinia, especially in the angio-paralytic form, are among the remedies recommended. In the angio-paralytic form, the author has also obtained very good results from the use of ergotin. On the other hand, in the sympathico-tonic, temporary relief seems to have been procured in some cases by the inhalation of nitrite of amyl. He attributes more influence to the constant current in relieving the symptoms of the disease. Indeed in some cases he believes that it is able to effect a permanent cure. In hemicrania sympathico-tonica the positive pole is placed upon the cervical portion of the sympathetic, at the inner edge of the sterno-cleido-mastoid muscle, the other one is placed on the palm of the hand and the circuit closed. In the other form the position of the poles is reversed, and he directs that the current shall not only be suddenly closed in the metallic part of the circuit, but shall be made to produce a powerful excitation by means of repeated closures and openings, or in some cases by reversals. It is generally conceded that the induced current exercises no beneficial influence upon the course of migraine.

Dr. Eulenburg allows his patriotic feeling to get the better of his judgment when he assigns to Basedow the credit of having first accurately described the disease which in Germany is generally coupled with his name. Leaving out of consideration the fact that Flajani, a Roman physician, reported in 1802 three cases in which he calls attention to two of the most important of the symptoms, the enlargement of the thyroid gland and the palpitation of the heart; and that Parry in 1825, in a group of cases which he reports, describes one in which in addition to these symptoms there was prominence of the eyeballs, the prior claims of that great clinical teacher, Graves, of Dublin, ought not to be overlooked, for he appears to have called attention in his lectures to all the leading features of the disease as early as 1835, while Basedow's paper was not published until 1840.

The author, while admitting that the theory which refers all the symptoms of the disease to a primary affection of the sympathetic is very tempting, and that this theory is sustained by the results of post-mortem examinations in certain cases, says that it cannot be accepted unhesitatingly, inasmuch as certain of the symptoms are such as are commonly supposed to follow experimental section, or paralysis of the nerve; while others, on the contrary, might be caused by galvanization, and may be presumed to indicate a permanent condition of irritation. This difficulty would certainly be removed if Benedikt's assumption could be established which refers the struma to an active irritation of dilator nerves which run in the sympathetic. There would remain, however, a second objection which lies in the difficulty of conceiving of a permanent state of irritation continued for years together.

In addition to the remedies in general use in the treatment of this disease, Dr. Eulenburg recommends galvanization of the cervical sympathetic with the constant current. This agent has, he says, in the hands of Von Dusch not only reduced the rate of the pulse from 130 to 70 or 64 beats, but also brought about a diminution in the prominence of the eyes.

The article on epilepsy is by Prof. Nothnagel, of Jena, who treats of the subject at considerable length. He excludes from the category of epilepsy, as indeed do all the principal writers on nervous diseases, all cases of uræmic seizures, and all epileptiform convulsions in which demonstrable gross alterations exist in the cranial cavity, the effect of which taken altogether may be comprised in this, that they either directly or by simple mechanical conditions, occasion an anæmia of the brain substance. On the other hand, in opposition to Reynolds, he maintains that the form of reflex epilepsy ought to be maintained. It is a well-established fact, he says, that in persons who have become subject to epileptiform seizures as a result of a cicatrix or some such cause, these seizures do not occur only or exclusively after irritations of the cicatrix, but also quite spontaneously or after mental changes. The former would necessarily be the case if we had to do with reflex manifestations, and therefore we must assume that in these cases a peculiar change has taken place in the medulla oblongata. The fact, he continues, that recoveries take place after removal of the irritation, cannot be cited as disproving this view, for they generally occur only in cases which come under treatment soon, and in which therefore the epileptic change has not yet became inveterate. Finally, it does not favour the idea of simple reflex convulsions that (except in the case of wounds of the head) the first paroxysm follows only a considerable time, perhaps a week, after the establishment of the peripheral irritation. He thinks, however, it would be better to designate as secondary epilepsy, rather than reflex, all those cases in which an affection of the brain, the spinal cord, or the peripheral nerves is present as a source of excitement and a starting point for the disease, as this name commits us to no theory. The author further regards as epileptic not merely those attacks in which there is complete loss of consciousness without muscular spasm, generally known as *petit mal*, but also those which are marked only by simple dizziness, or in fact by any alteration whatever of the mental activity occurring paroxysmally, such as hallucinations and the like.

The author enters his protest against the use of the term spinal epilepsy, which was originally introduced by Brown-Séquard, even in those cases in which an actually existing epilepsy is developed in consequence of an affection of the spine. In these cases, he says, it has a certain justification, but is superfluous, and had better be replaced by the term secondary epilepsy. But he characterizes it as a misnomer when applied to the clonic and tonic seizures which occur as a symptom in spinal affections, which remain confined to the extremities or even to the legs, and are unaccompanied by any trace of mental changes. With just as much propriety, he adds, could we speak of a spinal accessory or median epilepsy in the case of clonic twitchings of the muscles of the fingers or of the neck which proceed from a peripheral affection of the median or spinal accessory nerve.

Prof. Nothnagel attaches much importance to hereditary influence in the production of epilepsy. He does not mean of course that the term inherited tendency should be taken in a limited sense, as if strictly epilepsy only in the ancestors led to the redevelopment of the disease in the descendants. On the contrary, it must be taken in a broader sense, and since it is the neurotic diathesis which is inherited, as was long ago insisted upon by Trousseau, the proposition may be enunciated that any neurosis in the parents, whether it be of a lighter or more serious kind, may plant in the children the germ which may develop into epilepsy. Where the disease is inherited, its first manifestations generally occur early in life. It does not appear, however, that mental disturbances occur earlier or more frequently in this than in other forms, the intelligence being more impaired by a frequent recurrence of the attacks than by any other cause.

Compared with inherited tendency all the other influences which affect the organism or the nervous system as a whole sink into insignificance as causes of epilepsy. It may, indeed, be asserted that most of these are without the power to produce the central change upon which the disease depends, and that in cases where they have seemed to do this, they have merely acted as the exciting causes of the first attack.

The author does not regard the prognosis of epilepsy as necessarily hopeless, although unable to verify by experience the very favourable results of Herpin, according to whom fifty per cent. of all epileptics are curable. Unquestionably a certain number recover spontaneously. Others get well upon the removal of the cause, and others are restored to health by means of appropriate treatment. The last are, however, a very small proportion of the whole number; the prospect of recovery being of course best in those cases in which treatment is begun soon after the first appearance of the seizures. It is said by Herpin to be good also in those cases which first begin after the fiftieth year.

When speaking of the treatment of epilepsy, Prof. Nothnagel says our success will depend very much upon the judgment with which we select the remedies appropriate to the case in hand; but it is to be regretted that he does not lay down any positive rules for our guidance. Indeed, beyond telling us that iron is to be given to anæmic patients, that plethora only requires treatment when excessive, and that the oxide of zinc is most efficient with patients under twenty years of age, he gives us none at all. It need hardly be added that bromide of potassium is the remedy upon which he places most reliance, saying of it, that, while it is not an infallible, sovereign anti-epileptic, it is certainly of more service than all other remedies. In some cases in which it failed to produce any good results, an improvement followed its use when given in combination with oxide of zinc. The cold-water treatment vigorously followed out has also sometimes in his experience been of great service.

In the course of his article on chorea, Prof. Ziemssen takes occasion to assert his belief that "the group of symptoms called chorea major is not a disease *sui generis*, but is only the product of genuine psychores and cerebral maladies on the one hand, and of hysteria and wilful simulation on the other," a conclusion which is certainly true of the great majority of the cases. As regards the connection between rheumatism and chorea the author says that their coexistence is so frequent as to indicate that they are the same affection under two forms. In common with most other writers, he places the seat of the changes upon which the disease depends in the brain, and especially in the great ganglia at its base, and says that these changes are induced, in some cases at least, by embolic processes. He admits, however, that there are others which cannot be explained in this way.

The remedies upon which the author relies principally in the treatment or chorea are arsenic and hydrate of chloral given in decidedly larger doses than usually recommended. On the other hand, he speaks disparagingly of the bromides and electricity, and only doubtfully of the cold-water treatment.

A very full description of hysteria, by Jolly, follows the article on chorea, in which the reader will find the various phases under which this chameleon disease presents itself fully considered. And to this succeeds an elaborate essay, occupying nearly a third of the volume, by Kussmaul, on Disturbances of Speech—an Attempt in the Pathology of Speech. We can recommend this most cordially to the student's attention, but unfortunately it is impossible to analyze it or even to criticize it within the limits allowed us for this notice. J. H. H.

ART. XXIV.—*Vortraege aus dem Gesammtgebiete der Augenheilkunde für Studirende und Aerzte.* Von Dr. LUDWIG MAUTHNER, K. K. Universitætsprofessor in Wien. Erstes Heft: *Die Sympathischen Augenleiden.* Erste Abtheilung: *Aetiologie, Pathologie.* 8vo. pp. 58. Wiesbaden: J. F. Bergmann. New York: B. Westermann & Co., 1878.

Lectures on Ophthalmology for Students and Physicians. By Dr. LUDWIG MAUTHNER, Imperial-Royal University Professor in Vienna. First Part: *Sympathetic Diseases of the Eye.* First Section: *Etiology, Pathology.*

THESE lectures or clinical studies by Professor Mauthner, of which this is the first instalment, will embrace the entire field of ophthalmology, and will appear from four to six times a year, at irregular intervals. Their author is one of the most scientific of living ophthalmologists, and his purpose of so popularizing the study of diseases of the eye as to be of interest and profit to all classes of medical men, will prove eminently successful, if we may judge from our personal knowledge of the man, and from a perusal of this first part of his work.

The brochure of 58 pages treats in the most masterly manner of the etiology and pathology of the sympathetic diseases of the eye, and the conclusion of this branch of the subject will appear in the second part of the work, which is shortly to be published. Mauthner begins with a most excellent definition, as follows: "Those diseases or affections which are produced in one eye by disease in the other, in which the disease of the first eye is the sole cause of disease in the second eye, are termed *sympathetic;*" and if we stand rigidly by this definition, we shall make but few mistakes in diagnosis.

Mauthner devotes a short preliminary section to the coarse or topographical anatomy of the eyeball, with special consideration of the so-called ciliary region, and then proceeds to discuss the various lesions which may lead to sympathetic trouble. Lesions of the ciliary region may be spontaneous in origin as well as traumatic, though the latter are the more frequent. The danger of injuries in this region is certainly very great, and not unfrequently the most unfortunate results follow operations here.

Mauthner also calls attention to the fact that traumatic lesions of this region may spontaneously turn out well, and a good result may be reached, and gives the history of an interesting case of this kind. Even where a foreign body has